CALIFORNIA DEPARTMENT OF FOOD AND AGRICULTURE
MEDICAL TOXICOLOGY BRANCH

SUMMARY OF TOXICOLOGY DATA

FOSAMINE

SB 950-312, Tolerance # 50097

August 6, 1986
Revised December 12, 1986

I. DATA GAP STATUS

Chronic rat:	Data gap, no study on file
Chronic dog:	Data gap, no study on file
Onco rat:	Data gap, no study on file
Onco mouse:	Data gap, no study on file
Repro rat:	Data gap, inadequate study, no adverse effect indicated
Terato rat:	Data gap, inadequate study, possible adverse effect indicated
Terato rabbit:	Data gap, no study on file

Gene mutation: No data gap, no adverse effect

Chromosome: No data gap, possible adverse effect

DNA damage: No data gap, no adverse effect

Neurotox: Not required

Note, Toxicology one-liners are attached

** indicates acceptable study
Bold face indicates possible adverse effect
3B>SB312.JRG

CHRONIC, RAT

No studies

CHRONIC, DOG

No studies

ONCOGENICITY, RAT

No studies

ONCOGENICITY, MOUSE

No studies

REPRODUCTION, RAT

004 17066 1969, Hazleton, AA, 8/14/85. Unacceptable - too few animals, dose selection not justified, no description of test article. No adverse reproductive effects reported. Sixteen /sex/group were fed 0, 200, 1000 and 5000/10,000 ppm.

013 36491 1975, Hazleton; JRG, 3/17/86. Supplement to 17066. Histopath. on kidneys.

TERATOLOGY, RAT

004 17067 1973, Haskell Labs; AA, 8/14/85. Unacceptable - dose selection not high enough and not justified, test material ;not described. A positive teratogenic effect was noted at the high dose as hydronephrosis with 15/76 in controls and 21/66 in high dose (p=0.04 by Fisher's exact). The low- and mid-dose groups were not examined. Twenty-eight females per group were fed 200, 1000 or 10,000 ppm, daysa 6-15. One each in mid- and high-dose groups had complete resorptions. No individual or litter data so difficult to evaluate the adverse effect.

TERATOGENICITY, RABBIT

No study on file.

MUTAGENICITY, GNMU

Bacteria

008 34795 1976, Haskell; AA, 8/6/85. Salmonella. Unacceptable - no repeat trial, individual plate counts are not included, test article not described. No mutagenic effect. Five strains exposed to 0 to 10,000 ug/plate, with and without activation.

013 36492 1976, Haskell; JRG, 3/17/86. Salmonella. Unacceptable - no repeat trial, no individual plate counts. No increase in mutation frequency. 0, 500, 1000, 2000, 2500, 5000, 7500 and 10,000 ug/plate with and without activation. Five strains.

Mammalian cells

** 004 17064 1982, Haskell, AA, 8/13/85. CHO/HGPRT. Initially evaluated by AA as unacceptable -- scattering of data, means of counting not indicated, use of formulated product. No significant mutagenic effect reported. Repeat trials with and without rat liver activation at 3.3, 6.7,

13.3, 26.7 and 33.3 ul/ml at 41.5% ai and 58.5% inerts. During normal peer review, this study was re-reviewed by JR and considered acceptable with no mutagenic effects thus filling the data gap. Full rationale is found on the supplemental review worksheet, record number 17064, dated 3/26/86.

MUTAGENICITY, CHROMOSOMES

004 17062 1982, Hazleton; AA, 8/13/85. In vivo cytogenetics in rats. Unacceptable - too few animals per group, test article not described. No adverse effect. Three per sex per group given 40, 1000, 3000 or 10,000 mg/kg by oral gavage and sampled at 6, 12, 24 and 48 hours.

** **004 17063** 1982, Haskell; AA, 8/13/85. CHO cytogenetics in vitro. Acceptable. A positive, clastogenic concentration-related effect is reported. CHO cells were exposed to 0-33.3 ul/ml -S9 (10 hours) or 0-60 ul/ml +S9 (2 hours), two trials.

MUTAGENICITY, DNA

** 004 17065 1982, Haskell; AA, 8/14/85. Rat hepatocytes, UDS. Acceptable - initially reviewed as having and inadequate number of nuclei analyzed. No evidence of UDS is reported. Zero to 10 mM, 8 concentrations, two trials, 25 per slide. During normal peer review by JR, 3/26/86, the objection of number of nuclei analyzed was eliminated but the study was still evaluated as unacceptable based on lack of information on viability of cells. Viability information was submitted 11/17/86, resulting in upgrading of the study to acceptable. JG, 12/12/86.